



# **Data Sheet Wöhr Parking Platform P503**

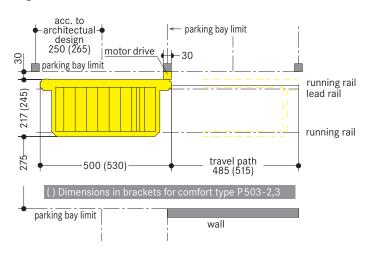
for longitudinal shunting

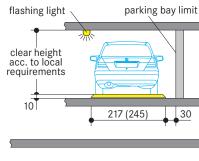
Suitable for condominium and office buildings.

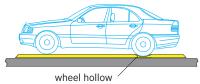
Dimensions in cm. Standard load per parking place max.  $2000 \, kg$  (max. wheel load  $500 \, kg$ ). (Comfort Type load per parking place max.  $2300 \, kg$  (max. wheel load  $575 \, kg$ ).)

# Layout dimensions

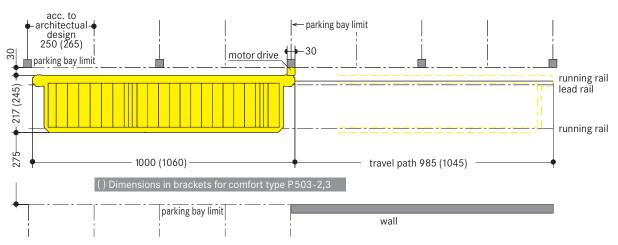
#### Single Platform P 503 EP for 1 car







#### Tandem Platform P 503 TP for 2 cars behind each other



|                     | Standard<br>503 EP - 2,0 | Comfort<br>503 EP - 2,3 | Standard<br>503 TP - 2,0 | Comfort<br>503 TP - 2,3 |
|---------------------|--------------------------|-------------------------|--------------------------|-------------------------|
| Quantity of cars    | 1                        | 1                       | 2                        | 2                       |
| Car length [m]      | 5.00                     | 5.30                    | 5.00                     | 5.30                    |
| Car weight [kg]     | 2000                     | 2300                    | 2000                     | 2300                    |
| Platform length [m] | 5.00                     | 5.30                    | 10.00                    | 10.60                   |
| Travel path [m]     | 4.85                     | 5.15                    | 9.85                     | 10.45                   |
| Platform width [m]  | 2.17                     | 2.45                    | 2.17                     | 2.45                    |

# Notes

- 1. Cars with higher wheel load or weight cannot park or drive over empty platforms first move, then drive.
- $2. \ \ \, \text{The manufacturer reserves the right to modify or alter above specifications}.$
- 3. We do not recommend installing longitudinal platforms in two way drive areas or in front of mechanical car parking systems, walkways, doors or emergency exits.
- 4. The parking platforms, max. height approx. 10 cm, have ramped edges and corners and it is therefore possible to drive over them by car.
- 5. In the case that local requirements require minimum ceiling heights, please remember to add the platform height.



Otto Wöhr GmbH Auto-Parksysteme



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#### **Evenness and tolerances**

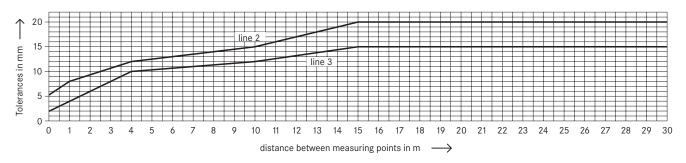
According to EN 14010 the danger of trapping between nonparallel platforms edges and the ground has to be prevented. The distance between the lower flange of the platforms and the garage ground must therefore not exceed 2 cm.

To adhere to the safety regulations and to get the necessary even ground, the tolerances of evenness to DIN 18202, table 3, line 3,  $\frac{1}{2}$ must not be exceeded. Therefore exact levelling of the ground by the client is essential.

# Abstract from DIN 18202, table 3

| column | 1  | 2 | 3 | 4                          | 5  | 6  |
|--------|--|---|---|----------------------------|----|----|
| line   | reference  |   |   | rements<br>points dis<br>4 |    |    |
| 2      | Unfinished to surface of covers, subconcrete and subsoils for higher demands, e.g. as foundation for cast plaster floor, industrial soils, paving tiles and slabstone paving, compund floor paving. Finished surfaces for minor purposes, e.g. warehouses, cellars | 5 | 8 | 12                         | 15 | 20 |
| 3      | Finished grounds, e.g. floor pavement serving as foundation for coverings. Coverings, tile coverings, PVC flooring and glued coverings.  | 2 | 4 | 10                         | 12 | 15 |

 $<sup>^{\</sup>star}$  Intermediate values are to be taken out the diagram and must be rounded-off to mm.



# Check points

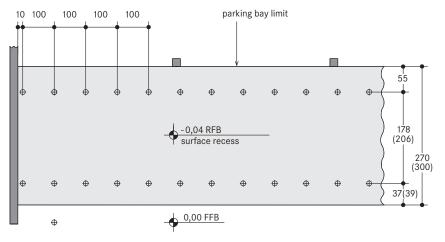
The evenness of a surface is checked independently of its position and slope by bore hole gauges between two check points on the surface.

WÖHR normally make a random test using single measurements in case of obviously inaccurate surfaces.

For uniform examination of the evenness of the ground surface the following points are defined as measuring and check points:

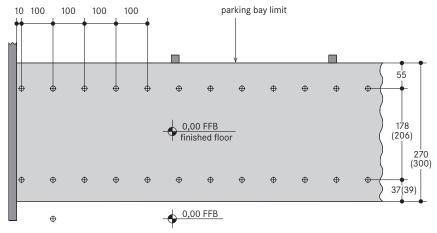
- a) for surface recessb) for finished floor

# a) Layout for surface recess width 270 (300) cm.



⊕ Measuring points at 100 cm points for checking unevenness acc. to DIN 18202, table 3, line 2, or acc. diagram

# b) Layout for finished floor after placing floor pavement



 Measuring points at 100 cm points for checking unevenness acc. to DIN 18202, table 3, line 3, or acc. diagram

#### Track and floor details

The moving rail load of each platform wheel is max. 4 kN.

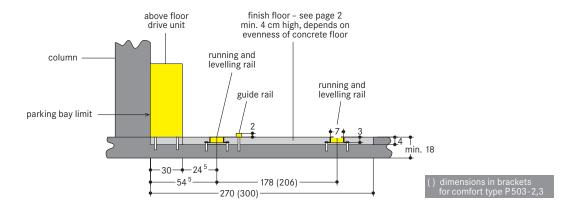
The evenness of the floor + screed must be achieved according to DIN 18202, table 3, line 2. After checking the floor + screed the levelling rails are mounted on top of the highest point.

The underlining and fixing of the levelling rails occurs at the intended fixing points. For the laying of the running and levelling rails a meter tear is to be attached permanently for every railway track by the client.

The screed is to be peeled off by the client on height of the levelling rails. Do not use mastic asphalt. The running rails are fastened after placement of the screed with heavy duty anchor bolts. Evenness according to DIN 18202, table 3, line 3.

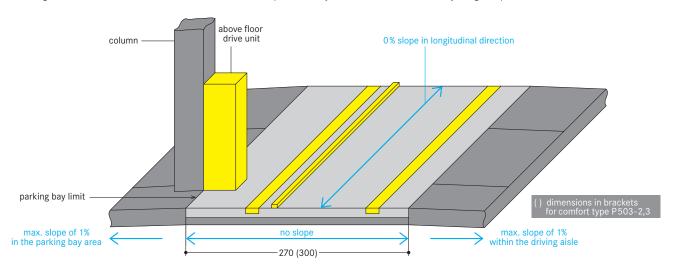
In the area of the railway track no expansion gap or building dividing gaps are allowed.

With later installations of the parking platforms, dependent on the ground evenness, an additional screed must be taken into consideration by the client. The decision of the steps occurs after a levelling.



# Drainage

According to EN 14010 the distance between finished floor and platform may not exceed 2 cm to avoid any danger to persons feet.



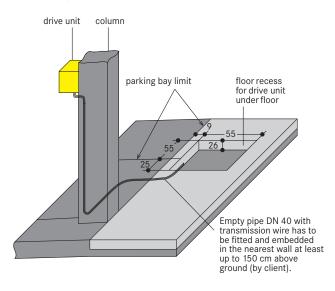
#### Above floor drive

This drive solution is used for new garage buildings and for existing car parks. It is mounted in front of columns using the available space and avoiding pit arrangements. The above floor drive unit has a moveable cover with electrical sensors. If the cover is moved the platform stops immediately in order to avoid any accidents. In the case of garage renovations consider a finish floor to attain the evenness tolerances.

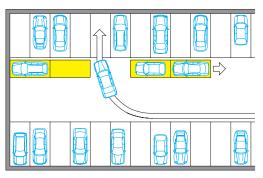
# above floor drive unit height = 100 cm width = 30 x 30 cm

#### Drive unit under floor

This version is fitted in new buildings or when the installation of the parking platform drives does not depend on columns. In order to make sure that no water can penetrate through the empty pipe DN 40 into the motor, the empty pipe with the transmission wire must be fitted and embedded in the columns and walls at least up to 150 cm above the ground. The motor box must be effused or set in to concrete after the installation by the client.

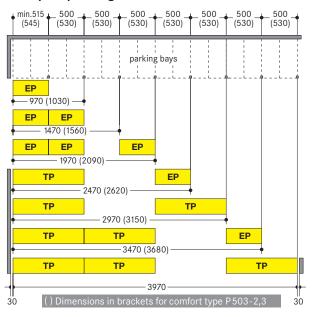


# Function



Occupied parking platforms are shifted by means of hold to run device until parking places behind or in front of/opposit of them can be crossed.

# Help for planning



- If parking places are opposite each other, the axials must coincide.
   If it is not possible, platform extensions must be provided.
- Parking platforms with incorporated drives (current supply withcable), which have a longer shifting way than the platform length are available for special cases when standard drive units are not possible.
- 3. For Single Platforms (EP) we recommend a minimum distance of 650 cm to the wall at the end of the driving lane, starting from the turning point of the platform drive. Otherwise the conventional parking places behind cannot be used comfortably.
- The length of a unit group of parking platforms must not exceed 40 m. Several units can be added in very long driving lanes.

#### Maintenance

Regular maintenance by qualified personnel can be provided by means of an Annual Service Contract.

# Protection against corrosion

Independent of a maintenance workings has to be carried out acc. to Wöhr Cleaning and Maintenance Instruction regularly.

Clean up galvanized parts and platforms of dirt and road salt as well as other pollution (corrosion danger)!

Garage must be always ventilated and dearated well.

# Illumination

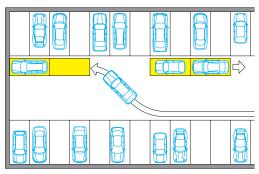
Illumination has to be considered acc. to local requirements by client.

# Temperature

The installation is designed to operate between +5° and +40°C. Atmospheric Humidity: 50% at +40°C. If the local circumstances differ from the above please contact Wöhr.

#### Conformity test

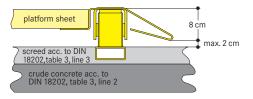
All our systems are checked according to EC machinery directive 98/37/EG and EN 14010.



Parking places on platforms are directly driven onto or the parking platforms are shifted so that enough driving space is available to drive onto and park.

#### Product liability

Wöhr does not take any liability for damages due to squeezing danger because the evenness tolerances are not fulfilled. The distance between the lower edge of the platform and the finished floor may not exceed 2 cm.



#### Noise

Ball bearings of the rollers provide a low sound level.

# Protection against corrosion

The railway track and the driving sheets are hot-dip galvanized according to the German regulation DIN EN ISO 1461, approx. 45  $\mu m$  zinc coating.

The whole frame is hot-dip galvanized according to the German regulation DIN EN 10326, NA 275 g/qm.

Steel parts of the motor and motor beams are electrostatic powder-coated with powder varnish on Epoxid- and polyester resin base, satin-finished, layer approx. 80  $\mu m$ , pebble grey RAL 7032.

An additional varnishing by the client is possible with a 1K-Acrylat system or 2K-Acrylisocyanat system.

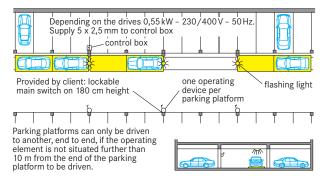
Parts, which do not allow due to technical reasons a powder coating are sandblased, grounded and provided with a further painting, pebble grey

Chains, gear racks, chain- and gear rack wheels remains for functional reasons untreated.

#### Control

The control of the parking platforms is carried out by hold-to-run-device with a left/right buttons. The current supply must be provided by the client with  $5 \times 2,5 \text{ mm}^2$ , 230/400 V, 50 Hz to the switch box of the installation. Electrical power schedules are available on request.

## **Electrical installation**



#### Dimensions

All dimensions are in cm.